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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/775,570	02/09/2004	Sudhir Govind Deshmukh	IJ0077USNA	1447

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EXAMINER	
FIDLER, SHELBY LEE	

ART UNIT	PAPER NUMBER
2861	

DATE MAILED: 12/29/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/775,570	DESHMUKH ET AL.	
	Examiner	Art Unit	
	Shelby Fidler	2861	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on _____.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) 1-15 is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) 1-15 is/are rejected.

7)☒ Claim(s) 9 and 14 is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☒ The specification is objected to by the Examiner.

10)☒ The drawing(s) filed on 2/9/2004 is/are: a)☒ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date 2/9/2004.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

Specification

The abstract of the disclosure is objected to because it is replete with errors. Line 5-7 of the abstract recites an incomplete sentence. Lines 11-12 recite "The device does not dispense the composition *is* the current information does not match . . . " Correction is required. See MPEP § 608.01(b).

Claim Objections

Claim 9 is objected to because of the following informalities: There is no antecedent basis for "said step (C1)," recited in line 1. Appropriate correction is required.

Claim 14 is objected to under 37 CFR 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant is required to cancel the claim(s), or amend the claim(s) to place the claim(s) in proper dependent form, or rewrite the claim(s) in independent form. Claim 14 is claiming a storage medium rather than the dispensing device of claim 1, on which it claims dependence.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-2, 4-6, and 8-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Owen et al. (US 2004/0085565 A1) in view of Hirst (US 5930553), and further in view of Cook (US 6155664).

With regards to claim 1, Owen teaches a dispensing device comprising:

(A) a client computer usable storage medium located in a client computer of the dispensing device (*element 54, Figure 4*), and a host computer usable storage medium located in a host computer (*element 74, Figure 4*) in communication with the client computer (*element 78, Figure 4*);

(B) one or more reservoirs (*element 32B, Figure 4*) containing dispensable compositions (*elements 64, Figure 4*), the reservoirs being positioned in the dispensing device (*paragraph 29, lines 4-5*), and having identification tags affixed thereto (*paragraph 29, lines 6-7*);

(C) means for dispensing one or more dispensable compositions through one or more dispensing heads (*dispensing head is inherent to inkjet printing device 104B, paragraph 26, lines 1-2),* the means for dispensing being in communication with the client (*via unreferenced arrows through interrogator 52, Figure 4*) and the host computers (*via network 76, Figure 4*).

(D) means for reading (*paragraph 30, lines 17-19*) current dispensable composition information of the dispensable compositions disposed on the identification tags (*paragraph 30, lines 3-5*).

(E) means for writing (*paragraph 30, lines 17-19*) updated dispensable composition information of the dispensable compositions to the identification tags (*paragraph 17, lines 1-7*); and

(F1) means for configuring computer readable program code devices to cause the means for reading to read the current dispensable composition information (*paragraph 39, lines 14-18*) and to store the current information on the client computer and the host computer (*paragraph 21, lines 1-5*);

(F2) storing dispensable composition information of the dispensable compositions on the host computer and the client computer (*paragraph 21, lines 1-5*).

(F4) means for configuring computer readable program code devices to cause the host computer to generates the updated dispensable composition information of the dispensable compositions (*paragraph 21, lines 1-9 in combination with paragraph 39, lines 14-17 show that the host processor 202 executes updatable composition information*); and

(F5) means for configuring computer readable program code devices to cause the means for writing to write the updated dispensable composition information to the identification tags and to store the updated information on the host computer, or on the client computer and the host computer (*paragraph 21, lines 1-9*).

Owen does not expressly teach the computer readable program code resides in both the client and host computers. Hirst teaches

(F) that the computer readable program code resides in the client computer usable storage and the host computer usable storage media (*col. 2, lines 33-37*);

Owen does not expressly teach terminating dispensing of dispensable composition if the current composition information does not match with stored composition information. Cook teaches

(F2) means for configuring computer readable program code devices (*controller 31, col. 10, line 36*) to cause the means for dispensing to terminate dispensing the dispensable compositions if the current information does not match (*col. 10, lines 46-49*) with stored dispensable composition information of the dispensable compositions (*col. 10, lines 36-41*).

(F3) means for configuring computer readable program code devices (*controller 31, col. 10, line 36*) to cause the means for dispensing to dispense the dispensable compositions in accordance with a dispensing program if the current information matches (*col. 10, lines 41-46*) with the stored dispensable composition information (*col. 10, lines 36-41*).

With regards to claim 2, Cook teaches that the reservoirs are positioned in one or more racks of the dispensing device (*"carriage" is read as rack, col. 5, lines 39-40*).

With regards to claim 4, Owen teaches that the identification tag is a RFID tag (*paragraph 29, lines 8-9*).

With regards to claim 5, Owen teaches that one or more identification tag interrogators comprise the means for reading and writing (*paragraph 30, lines 17-19*).

With regards to claim 6, Owen teaches that the identification tag is a passive or an active RFID tag (*paragraph 31, lines 1-7*).

With regards to claim 8, Owen teaches that the dispensable composition is an electrically conductive ink (*paragraph 18, line 7*).

With regards to claim 9, Owen teaches that the dispensing composition is dispensed on a target substrate (*paragraph 34, lines 6-8*).

With regards to claim 10, Owen teaches that the target substrate is a cellulose paper (*paragraph 34, line 8*).

With regards to claim 11, Owen teaches that the means (F2) comprise means for configuring computer readable program code devices to cause the host computer to determine the amount of the dispensable compositions remaining in one or more of the reservoirs (*paragraph 43, lines 13-17*).

With regards to claim 12, Owen teaches that the means (F4) comprise means for configuring computer readable program code devices to cause the host computer to deduct dispensed quantities of one or more of the dispensable compositions (*paragraph 36, lines 7-10*) from current quantities registered in the current dispensable composition information (*paragraph 39, lines 22-25*) to arrive at updated quantities of one or more dispensable compositions (*paragraph 39, lines 16-17*) registered in the updated dispensable composition information (*paragraph 17, lines 1-7*).

With regards to claim 13, Cook teaches that the dispensing head is a printhead (*col. 5, line 29*).

With regards to claim 14, Owen teaches that the computer readable program code means is stored on a portable computer usable storage medium (*paragraph 39, lines 1-12 in combination with paragraph 38, lines 11-14*).

With regards to claim 15, Owen teaches that the portable computer usable storage medium is a CD-ROM (*paragraph 38, line 14*).

At the time of invention, it would have been obvious to a person of ordinary skill in the art to combine Owen's invention with the locality of Hirst's computer readable program code, and the printing controls of Cook. The motivation for combining with Hirst, as taught by Hirst, is that the software in the client and host computers can generate requests and recognize

requests for information about various consumables (*col. 3, lines 3-9*). The motivation for combining with Cook, as taught by Cook, is so that the printer may be controlled properly based on the compatibility of the ink and the printhead (*col. 1, lines 53-58 in combination with col. 2, lines 25-28*).

Claim 3 is rejected under 35 U.S.C. 103(a) as being unpatentable over Owen et al. in view of Hirst, and further in view of Cook, as applied to claim 1 above, and further in view of Allen (US 4973993).

With regards to claim 3, Owen does not expressly teach that the reservoir is a bag nested in a receptacle. Allen teaches that the reservoir is a disposable bag (*col. 4, lines 27-28*) nested in a receptacle (*element 14 nested in element 142, Figure 3*) located in the dispensing device (*col. 1, lines 7-8*).

At the time of invention, it would have been obvious to a person of ordinary skill in the art to modify Owen's reservoir with Allen's reservoir bag. The motivation for doing so, as taught by Allen, is that the bag can be replaced when empty (*col. 4, lines 27-28*).

Claim 7 is rejected under 35 U.S.C. 103(a) as being unpatentable over Owen et al. in view of Hirst, and further in view of Cook, as applied to claim 1 above, and further in view of Lawler, Jr. et al. (US 5964656).

With regards to claim 7, Owen does not expressly teach that the RFID tag is disposed on an insulated substrate. Lawler, Jr. teaches that the RFID tag is disposed on an insulated substrate (*col. 9, lines 27-29*).

At the time of invention, it would have been obvious to a person of ordinary skill in the art to modify Owen's RFID tag with Lawler, Jr.'s insulated substrate. The motivation for doing so, as taught by Lawler, Jr., is that the insulated material ensures that the tag is kept insulated from ferrous materials, which are known to interfere with the operation of the tag (*col. 9, lines 11-15*).

Conclusion

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

SLF

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